



## SEQUENCE LISTING

<110> Marasco, Wayne  
Mhashilkar, Abner

<120> INTRABODY-MEDIATED CONTROL OF IMMUNE REACTIONS

<130> 700157-47577C

<140> 09/522,727

<141> 2000-03-10

<150> PCT/US98/19563

<151> 1998-09-18

<150> 60/059,339

<151> 1997-09-18

<160> 55

<170> PatentIn version 3.0

<210> 1

<211> 15

<212> PRT

<213> Homo sapiens

<400> 1

Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser  
1 5 10 15

<210> 2

<211> 15

<212> PRT

<213> Homo sapiens

<400> 2

Glu Ser Gly Arg Ser Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser  
1 5 10 15

<210> 3

<211> 14

<212> PRT

<213> Homo sapiens

<400> 3

Glu Gly Lys Ser Ser Gly Ser Gly Ser Glu Ser Lys Ser Thr  
1 5 10

<210> 4  
 <211> 15  
 <212> PRT  
 <213> Homo sapiens

<400> 4

Glu Gly Lys Ser Ser Gly Ser Gly Ser Glu Ser Lys Ser Thr Gln  
 1 5 10 15

<210> 5  
 <211> 14  
 <212> PRT  
 <213> Homo sapiens

<400> 5

Glu Gly Lys Ser Ser Gly Ser Gly Ser Glu Ser Lys Val Asp  
 1 5 10

<210> 6  
 <211> 14  
 <212> PRT  
 <213> Homo sapiens

<400> 6

Gly Ser Thr Ser Gly Ser Gly Lys Ser Ser Glu Gly Lys Gly  
 1 5 10

<210> 7  
 <211> 15  
 <212> PRT  
 <213> Homo sapiens

<400> 7

Lys Glu Ser Gly Ser Val Ser Ser Glu Gln Leu Ala Gln Phe Arg  
 1 5 10 15

<210> 8  
 <211> 16  
 <212> PRT  
 <213> Homo sapiens

<400> 8

Glu Ser Gly Ser Val Ser Ser Glu Glu Leu Ala Phe Arg Ser Leu Asp  
 1 5 10 15

<210> 9  
 <211> 35

*9 cont*

<212> DNA  
<213> Homo sapiens

<400> 9  
tttgcggccg ctcaggtgca rctgctcgag tcygg

35

<210> 10  
<211> 66  
<212> DNA  
<213> Homo sapiens

<400> 10  
agatccgccg ccaccgctcc caccacctcc ggagccaccg ccacctgagg tgaccgtgac 60  
crkggt 66

<210> 11  
<211> 69  
<212> DNA  
<213> Homo sapiens

<400> 11  
ggtggcggtg gctccggagg tgggtgggagc ggtggcgccg gatctgagct cswgmtgacc 60  
cagtctcca 69

<210> 12  
<211> 47  
<212> DNA  
<213> Homo sapiens

<400> 12  
gggtctagac tcgaggatcc ttattaacgc gttggtgcag ccacagt 47

<210> 13  
<211> 6  
<212> PRT  
<213> Homo sapiens

<400> 13  
Ser Glu Lys Asp Glu Leu  
1 5

<210> 14  
<211> 59  
<212> DNA  
<213> Homo sapiens

<400> 14  
gggtctagac tcgaggatcc ttattacagc tcgtcctttt cgcttggtgc agccacagt 59

<210> 15  
<211> 24  
<212> DNA  
<213> Homo sapiens

<400> 15  
tttaccatgg aacatctgtg gttc 24

c/ 24  
<210> 16  
<211> 30  
<212> DNA  
<213> Homo sapiens

<400> 16  
ttagcgcgct gaggtgaccg tgaccrkagg 30

<210> 17  
<211> 4  
<212> PRT  
<213> Homo sapiens

<400> 17  
Lys Asp Glu Leu  
1

<210> 18  
<211> 4  
<212> PRT  
<213> Homo sapiens

<400> 18  
Asp Asp Glu Leu  
1

<210> 19  
<211> 4  
<212> PRT  
<213> Homo sapiens

<400> 19  
Asp Glu Glu Leu  
1

<210> 20  
 <211> 4  
 <212> PRT  
 <213> Homo sapiens

<400> 20

Gln Glu Asp Leu  
 1

<210> 21  
 <211> 4  
 <212> PRT  
 <213> Homo sapiens

<400> 21

Arg Asp Glu Leu  
 1

<210> 22  
 <211> 7  
 <212> PRT  
 <213> Homo sapiens

<400> 22

Pro Lys Lys Lys Arg Lys Val  
 1 5

<210> 23  
 <211> 7  
 <212> PRT  
 <213> Homo sapiens

<400> 23

Pro Gln Lys Lys Ile Lys Ser  
 1 5

<210> 24  
 <211> 5  
 <212> PRT  
 <213> Homo sapiens

<400> 24

Gln Pro Lys Lys Pro  
 1 5

<210> 25

<211> 12  
 <212> PRT  
 <213> Homo sapiens

<400> 25

Arg Lys Lys Arg Arg Gln Arg Arg Arg Ala His Gln  
 1 5 10

<210> 26  
 <211> 16  
 <212> PRT  
 <213> Homo sapiens

<400> 26

Arg Gln Ala Arg Arg Asn Arg Arg Arg Arg Trp Arg Glu Arg Gln Arg  
 1 5 10 15

<210> 27  
 <211> 19  
 <212> PRT  
 <213> Homo sapiens

<400> 27

Met Pro Leu Thr Arg Arg Arg Pro Ala Ala Ser Gln Ala Leu Ala Pro  
 1 5 10 15

Pro Thr Pro

<210> 28  
 <211> 15  
 <212> PRT  
 <213> Homo sapiens

<400> 28

Met Asp Asp Gln Arg Asp Leu Ile Ser Asn Asn Glu Gln Leu Pro  
 1 5 10 15

<210> 29  
 <211> 32  
 <212> PRT  
 <213> Homo sapiens

<220>  
 <221> UNSURE  
 <222> (7) (8) (32)  
 <223> UNSURE

<400> 29

Met Leu Phe Asn Leu Arg Xaa Xaa Leu Asn Asn Ala Ala Phe Arg His  
1 5 10 15

Gly His Asn Phe Met Val Arg Asn Phe Arg Cys Gly Gln Pro Leu Xaa  
20 25 30

<210> 30

<211> 8

<212> PRT

<213> Homo sapiens

<400> 30

Gly Cys Val Cys Ser Ser Asn Pro  
1 5

<210> 31

<211> 8

<212> PRT

<213> Homo sapiens

<400> 31

Gly Gln Thr Val Thr Thr Pro Leu  
1 5

<210> 32

<211> 8

<212> PRT

<213> Homo sapiens

<400> 32

Gly Gln Glu Leu Ser Gln His Glu  
1 5

<210> 33

<211> 8

<212> PRT

<213> Homo sapiens

<400> 33

Gly Asn Ser Pro Ser Tyr Asn Pro  
1 5

<210> 34

<211> 8

<212> PRT

dx

<213> Homo sapiens

<400> 34

Gly Val Ser Gly Ser Lys Gly Gln  
1 5

<210> 35

<211> 8

<212> PRT

<213> Homo sapiens

<400> 35

Gly Gln Thr Ile Thr Thr Pro Leu  
1 5

<210> 36

<211> 8

<212> PRT

<213> Homo sapiens

<400> 36

Gly Gln Thr Leu Thr Thr Pro Leu  
1 5

<210> 37

<211> 8

<212> PRT

<213> Homo sapiens

<400> 37

Gly Gln Ile Phe Ser Arg Ser Ala  
1 5

<210> 38

<211> 8

<212> PRT

<213> Homo sapiens

<400> 38

Gly Gln Ile His Gly Leu Ser Pro  
1 5

<210> 39

<211> 8

<212> PRT

<213> Homo sapiens

<400> 39

Gly Ala Arg Ala Ser Val Leu Ser  
1 5

<210> 40

<211> 8

<212> PRT

<213> Homo sapiens

<400> 40

Gly Cys Thr Leu Ser Ala Glu Glu  
1 5

<210> 41

<211> 8

<212> PRT

<213> Homo sapiens

<400> 41

Gly Gln Asn Leu Ser Thr Ser Asn  
1 5

<210> 42

<211> 8

<212> PRT

<213> Homo sapiens

<400> 42

Gly Ala Ala Leu Thr Ile Leu Val  
1 5

<210> 43

<211> 8

<212> PRT

<213> Homo sapiens

<400> 43

Gly Ala Ala Leu Thr Leu Leu Gly  
1 5

<210> 44

<211> 8

<212> PRT

<213> Homo sapiens

<400> 44

Gly Ala Gln Val Ser Ser Gln Lys  
1 5

<210> 45  
<211> 8  
<212> PRT  
<213> Homo sapiens

<400> 45

Gly Ala Gln Leu Ser Arg Asn Thr  
1 5

<210> 46  
<211> 8  
<212> PRT  
<213> Homo sapiens

<400> 46

Gly Asn Ala Ala Ala Ala Lys Lys  
1 5

<210> 47  
<211> 8  
<212> PRT  
<213> Homo sapiens

<400> 47

Gly Asn Glu Ala Ser Tyr Pro Leu  
1 5

<210> 48  
<211> 8  
<212> PRT  
<213> Homo sapiens

<400> 48

Gly Ser Ser Lys Ser Lys Pro Lys  
1 5

<210> 49  
<211> 38  
<212> DNA  
<213> Homo sapiens

<400> 49

ccctctagac atatgtgaat tccaccatgg cccaggtc

<210> 50  
 <211> 25  
 <212> DNA  
 <213> Homo sapiens

<400> 50  
 tgmggagacg gtgaccrwwg tccct

25

<210> 51  
 <211> 837  
 <212> DNA  
 <213> human

<220>  
 <221> CDS  
 UNSURE  
 <222> (1)...(837)  
 (505)  
 <223> UNSURE  
 <400> 51

atg gaa cat ctg tgg ttc ttc ctt ctc ctg gtg gca gct ccc aga tgg 48  
 Met Glu His Leu Trp Phe Phe Leu Leu Leu Val Ala Ala Pro Arg Trp  
 1 5 10 15  
 gtc ctg tcc cag gtg caa ctg cag cag tca ggg gct gag ctg gca aga 96  
 Val Leu Ser Gln Val Gln Leu Gln Gln Ser Gly Ala Glu Leu Ala Arg  
 20 25 30  
 cct ggg gct tca gtg aag ttg tcc tgc aag gct tct ggc tac acc ttt 144  
 Pro Gly Ala Ser Val Lys Leu Ser Cys Lys Ala Ser Gly Tyr Thr Phe  
 35 40 45  
 act agt cac tgg atg cag tgg gtg aga cag agg cct gga cag ggt ctg 192  
 Thr Ser His Trp Met Gln Trp Val Arg Gln Arg Pro Gly Gln Gly Leu  
 50 55 60  
 gaa tgg att ggg act att tat cct gga gat ggt gat act agg tac act 240  
 Glu Trp Ile Gly Thr Ile Tyr Pro Gly Asp Gly Asp Thr Arg Tyr Thr  
 65 70 75 80  
 cag aat ttc aag ggc aag gcc aca ttg act gca gat aag tcc tcc acc 288  
 Gln Asn Phe Lys Gly Lys Ala Thr Leu Thr Ala Asp Lys Ser Ser Thr  
 85 90 95  
 aca gcc tac tta cac ctc agc agc ttg tca tct gaa gac tct gcg gtc 336  
 Thr Ala Tyr Leu His Leu Ser Ser Leu Ser Ser Glu Asp Ser Ala Val  
 100 105 110  
 tat tat tgt gca aga gat gag att act acg gtt gta ccc cgg ggg ttt 384  
 Tyr Tyr Cys Ala Arg Asp Glu Ile Thr Thr Val Val Pro Arg Gly Phe  
 115 120 125  
 gct tac tgg ggc caa ggg acc tcg gtc acc gtc tcc tca ggt ggc ggt 432  
 Ala Tyr Trp Gly Gln Gly Thr Ser Val Thr Val Ser Ser Gly Gly Gly  
 130 135 140  
 ggc tcg ggc ggt ggt ggc tcg ggt ggc ggc gga tct gag ctc gtg ctc 480  
 Gly Ser Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser Glu Leu Val Leu  
 145 150 155 160  
 acc caa acc cca acc tcc ctg gct ncc tct ctg gga gac aga gtc acc 528

Thr Gln Thr Pro Thr Ser Leu Ala Xaa Ser Leu Gly Asp Arg Val Thr  
 165 170 175  
 atc agt tgc agg gca agt cag gac att agc agt tat tta aac tgg tat 576  
 Ile Ser Cys Arg Ala Ser Gln Asp Ile Ser Ser Tyr Leu Asn Trp Tyr  
 180 185 190  
 cag cag aaa cca gat gga act att aaa ctc ctg atc tac tac aca tca 624  
 Gln Gln Lys Pro Asp Gly Thr Ile Lys Leu Leu Ile Tyr Tyr Thr Ser  
 195 200 205  
 aga tta tat tca gga gtc cca cca agg ttc agt ggc agt ggg gct gga 672  
 Arg Leu Tyr Ser Gly Val Pro Pro Arg Phe Ser Gly Ser Gly Ala Gly  
 210 215 220  
 aca gat tat tct ctc acc atc agc aac ctg gag caa gaa gat ttt gcc 720  
 Thr Asp Tyr Ser Leu Thr Ile Ser Asn Leu Glu Gln Glu Asp Phe Ala  
 225 230 235 240  
 act tac ttt tgc caa cag ggt aat gtg att ccg tac acg ttc gga ggg 768  
 Thr Tyr Phe Cys Gln Gln Gly Asn Val Ile Pro Tyr Thr Phe Gly Gly  
 245 250 255  
 ggg acc aag ctg gaa atg aaa cgg gct gat gct gca cca act gta agc 816  
 Gly Thr Lys Leu Glu Met Lys Arg Ala Asp Ala Ala Pro Thr Val Ser  
 260 265 270  
 gaa aag gac gag ctg taa taa 837  
 Glu Lys Asp Glu Leu  
 275

<210> 52  
 <211> 277  
 <212> PRT  
 <213> Homo sapiens

<220>  
 <221> UNSURE  
 <222> (169)  
 <223> UNSURE

<400> 52

Met Glu His Leu Trp Phe Phe Leu Leu Leu Val Ala Ala Pro Arg Trp  
 1 5 10 15  
 Val Leu Ser Gln Val Gln Leu Gln Gln Ser Gly Ala Glu Leu Ala Arg  
 20 25 30  
 Pro Gly Ala Ser Val Lys Leu Ser Cys Lys Ala Ser Gly Tyr Thr Phe  
 35 40 45  
 Thr Ser His Trp Met Gln Trp Val Arg Gln Arg Pro Gly Gln Gly Leu  
 50 55 60  
 Glu Trp Ile Gly Thr Ile Tyr Pro Gly Asp Gly Asp Thr Arg Tyr Thr  
 65 70 75 80

Gln Asn Phe Lys Gly Lys Ala Thr Leu Thr Ala Asp Lys Ser Ser Thr  
 85 90 95  
 Thr Ala Tyr Leu His Leu Ser Ser Leu Ser Ser Glu Asp Ser Ala Val  
 100 105 110  
 Tyr Tyr Cys Ala Arg Asp Glu Ile Thr Thr Val Val Pro Arg Gly Phe  
 115 120 125  
 Ala Tyr Trp Gly Gln Gly Thr Ser Val Thr Val Ser Ser Gly Gly Gly  
 130 135 140  
 Gly Ser Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser Glu Leu Val Leu  
 145 150 155 160  
 Thr Gln Thr Pro Thr Ser Leu Ala Xaa Ser Leu Gly Asp Arg Val Thr  
 165 170 175  
 Ile Ser Cys Arg Ala Ser Gln Asp Ile Ser Ser Tyr Leu Asn Trp Tyr  
 180 185 190  
 Gln Gln Lys Pro Asp Gly Thr Ile Lys Leu Leu Ile Tyr Tyr Thr Ser  
 195 200 205  
 Arg Leu Tyr Ser Gly Val Pro Pro Arg Phe Ser Gly Ser Gly Ala Gly  
 210 215 220  
 Thr Asp Tyr Ser Leu Thr Ile Ser Asn Leu Glu Gln Glu Asp Phe Ala  
 225 230 235 240  
 Thr Tyr Phe Cys Gln Gln Gly Asn Val Ile Pro Tyr Thr Phe Gly Gly  
 245 250 255  
 Gly Thr Lys Leu Glu Met Lys Arg Ala Asp Ala Ala Pro Thr Val Ser  
 260 265 270  
 Glu Lys Asp Glu Leu  
 275

<210> 53  
 <211> 837  
 <212> DNA  
 <213> human

<220>  
 <221> CDS  
 <222> (1)...(837)  
 <400> 53

atg gaa cat ctg tgg ttc ttc ctt ctc ctg gtg gca gct ccc aga tgg 48  
 Met Glu His Leu Trp Phe Phe Leu Leu Leu Val Ala Ala Pro Arg Trp

1 5 10 15  
 gtc ctg tcc cag gtg caa ctg cag cag tct ggg gct gag ctg aca aga 96  
 Val Leu Ser Gln Val Gln Leu Gln Gln Ser Gly Ala Glu Leu Thr Arg  
 20 25 30  
 cct ggg gct tca gtg aag ttg tcc tgc aag gct tct ggc tac acc ttt 144  
 Pro Gly Ala Ser Val Lys Leu Ser Cys Lys Ala Ser Gly Tyr Thr Phe  
 35 40 45  
 act agt cac tgg atg cag tgg gtg aga cag agg cct gga cag ggt ctg 192  
 Thr Ser His Trp Met Gln Trp Val Arg Gln Arg Pro Gly Gln Gly Leu  
 50 55 60  
 gaa tgg att ggg act att tat cct gga gat ggt gat act agg tac act 240  
 Glu Trp Ile Gly Thr Ile Tyr Pro Gly Asp Gly Asp Thr Arg Tyr Thr  
 65 70 75 80  
 cag aat ttc aag ggc aag gcc aca ttg act gca gat aag tcc tcc acc 288  
 Gln Asn Phe Lys Gly Lys Ala Thr Leu Thr Ala Asp Lys Ser Ser Thr  
 85 90 95  
 aca gcc tac tta cac ctc agc agc ttg tca tct gaa gac tct gcg gtc 336  
 Thr Ala Tyr Leu His Leu Ser Ser Leu Ser Ser Glu Asp Ser Ala Val  
 100 105 110  
 tat tat tgt gca aga gat gag att act acg gtt gta ccc cgg ggg ttt 384  
 Tyr Tyr Cys Ala Arg Asp Glu Ile Thr Thr Val Val Pro Arg Gly Phe  
 115 120 125  
 gct tac tgg ggc caa ggg acc ttg gtc acc gtc tcc tca ggt ggc ggt 432  
 Ala Tyr Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser Gly Gly Gly  
 130 135 140  
 ggc tcg ggc ggt ggt ggg tcg ggt ggc ggc gga tct gag ctc gtg ctc 480  
 Gly Ser Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser Glu Leu Val Leu  
 145 150 155 160  
 acc cag tct cca tcc agt ctg tct gca tcc ctt gga gac aca att acc 528  
 Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Leu Gly Asp Thr Ile Thr  
 165 170 175  
 atc act tgc cat gcc agt cag aac att aat gtt tgg tta agt tgg tac 576  
 Ile Thr Cys His Ala Ser Gln Asn Ile Asn Val Trp Leu Ser Trp Tyr  
 180 185 190  
 cag cag aaa cca gga aat att cct caa cta ttg atc tat aag gct tcc 624  
 Gln Gln Lys Pro Gly Asn Ile Pro Gln Leu Leu Ile Tyr Lys Ala Ser  
 195 200 205  
 aac ttg cac aca ggc gtc cca tca agg ttt agt ggc cgt gga tct gga 672  
 Asn Leu His Thr Gly Val Pro Ser Arg Phe Ser Gly Arg Gly Ser Gly  
 210 215 220  
 aca ggt ttc aca tta acc atc agc agc ctg cag cct gaa gac att ggc 720  
 Thr Gly Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro Glu Asp Ile Gly  
 225 230 235 240  
 act tac tac tgt caa cag ggt caa agt tat cct ctg acg ttc ggt gga 768  
 Thr Tyr Tyr Cys Gln Gln Gly Gln Ser Tyr Pro Leu Thr Phe Gly Gly  
 245 250 255 260  
 ggc acc aag ctg gaa atc aaa cgg gct gat gct gca cca act gta agc 816  
 Gly Thr Lys Leu Glu Ile Lys Arg Ala Asp Ala Ala Pro Thr Val Ser  
 265 270 275  
 gaa aag gac gag ctg taa taa 837  
 Glu Lys Asp Glu Leu  
 280

<210> 54  
 <211> 277  
 <212> PRT  
 <213> Homo sapiens

<400> 54

Met Glu His Leu Trp Phe Phe Leu Leu Leu Val Ala Ala Pro Arg Trp  
 1 5 10 15  
 Val Leu Ser Gln Val Gln Leu Gln Gln Ser Gly Ala Glu Leu Thr Arg  
 20 25 30  
 Pro Gly Ala Ser Val Leu Leu Ser Cys Leu Ala Ser Gly Tyr Thr Phe  
 35 40 45  
 Thr Ser His Trp Met Gln Trp Val Arg Gln Arg Pro Gly Gln Gly Leu  
 50 55 60  
 Glu Trp Ile Gly Thr Ile Tyr Pro Gly Asp Gly Asp Thr Arg Tyr Thr  
 65 70 75 80  
 Gln Asn Phe Leu Gly Leu Ala Thr Leu Thr Ala Asp Leu Ser Ser Thr  
 85 90 95  
 Thr Ala Tyr Leu His Leu Ser Ser Leu Ser Ser Glu Asp Ser Ala Val  
 100 105 110  
 Tyr Tyr Cys Ala Arg Asp Glu Ile Thr Thr Val Val Pro Arg Gly Phe  
 115 120 125  
 Ala Tyr Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser Gly Gly Gly  
 130 135 140  
 Gly Ser Gly Gly Gly Gly Ser Gly Gly Gly Gly Ser Glu Leu Val Leu  
 145 150 155 160  
 Thr Gln Ser Pro Ser Ser Leu Ser Ala Ser Leu Gly Asp Thr Ile Thr  
 165 170 175  
 Ile Thr Cys His Ala Ser Gln Asn Ile Asn Val Trp Leu Ser Trp Tyr  
 180 185 190  
 Gln Gln Leu Pro Gly Asn Ile Pro Gln Leu Leu Ile Tyr Leu Ala Ser  
 195 200 205  
 Asn Leu His Thr Gly Val Pro Ser Arg Phe Ser Gly Arg Gly Ser Gly  
 210 215 220  
 Thr Gly Phe Thr Leu Thr Ile Ser Ser Leu Gln Pro Glu Asp Ile Gly  
 225 230 235 240

Thr Tyr Tyr Cys Gln Gln Gly Gln Ser Tyr Pro Leu Thr Phe Gly Gly  
 245 250 255

Gly Thr Leu Leu Glu Ile Leu Arg Ala Asp Ala Ala Pro Thr Val Ser  
 260 265 270

Glu Leu Asp Glu Leu  
 275

<210> 55

<211> 4

<212> PRT

<213> Homo sapiens

<400> 55

Arg Lys Lys Arg  
 1